

Utah/Nevada Snake Valley water agreement

brian moench [drmoench@yahoo.com]

Sent:

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To:

snakevalley@utah.gov

Cc:

[Snake Valley](#)

Attachments:

 [UPHE supplemental letter o~1.rtf \(10 KB\)](#) [[Open as Web Page](#)]

Please accept the attached letter for the official public comments on the Snake Valley agreement.

Brian Moench

The Utah Physicians for a Healthy Environment (UPHE) have thoroughly studied the proposal by the SNWA to drain significant quantities of water from the aquifers of Nevada and the Snake Valley that is shared by Nevada and Utah. We wish to expand on our previously submitted comments.

We draw much of our information on the legal and political history on this issue from investigative reports appearing in the Las Vegas Sun, Los Angeles Times, Bloomberg News, and transcripts from southern Nevada TV news reports.

There is wide spread skepticism on the part of many highly regarded and well qualified biologists, geologists and hydrologists who are not under contract or the employ of the Southern Nevada Water Authority about whether substantial water can be withdrawn from the aquifers of Eastern Nevada and Western Utah without a drop in the water table of between 50 and several hundred feet. This is the consistent position of experts such as Timothy Durbin, James Deacon, John Bredehoeft, Martin Mifflin and David Charlet. We also note that the EPA, BLM, Nation Park Service and Interior Dept. eventually abandoned objections apparently due to Congressional or other political pressures rather than a revision or "improvement" in their scientific data regarding the water table drop.

We have also listened to and read testimony from the residents, farmers and ranchers who have lived and worked in the affected area for many years and derive their livelihood from water dependent activity. Uniformly they express disbelief in the claims of excess water being available. The figures in the agreement regarding volume of available water seem to many experts and Snake Valley residents to be based on historically "wet" years and unrealistically optimistic and self serving projections of future precipitation.

We are aware that under Nevada law "water mining" is illegal, prohibiting a manipulated drop in the water table, but that it also gives no protection to vegetation like the phreatophytes which serve the critical function of anchoring desert soil and preventing dust storms. In fact, in the neighboring Spring Valley, the SNWA applied to the Nevada state water engineer for expropriation rights to the phreatophytes' calculated share of the water.

We have read several journalists' reports stating that internal memos from the SNWA revealed a specific strategy to pump the aquifers aggressively enough to kill the phreatophytes so that they could not compete for water all while claiming publicly that they intended to spare the phreatophytes.

Even if this alleged strategy is not deliberately employed, there is substantial risk that air quality throughout the Intermountain area will be adversely impacted. In our examination of the agreement we find very little comfort that the suggested monitoring will translate into public health protection for several reasons.

1. The proposed monitoring process for assessing adverse impacts seems

remarkably nonspecific and therefore easily subject to possible manipulation. The multitude of factors influencing ambient PM10 concentrations at monitoring stations would almost surely limit the ability to assign responsibility to the pipeline as the cause of increased PM10 levels.

2. There is no specificity about what concentration levels, frequency or duration of PM10 increases would trigger a protest from the state of Utah or begin the "dispute resolution process".

3. There is no requirement that the person representing Utah in any "dispute resolution process" will have either environmental or health expertise or the approval of organizations that do. That would be essential for protection of Utah public health in any future dispute.

4. The lag time between the death of phreatophytes and their eventual disappearance from the landscape almost certainly guarantees that the air quality impacts may not appear until it is too late to revive them. If air quality is used as the threshold for beginning the "dispute resolution process", by then the damage to native vegetation may be irreversible. Many biologists feel that if these plants are killed off it may be a prolonged period of time, likely decades, before a new generation returns to the landscape, especially in a hotter drier climate that the Great Basin is virtually guaranteed to experience in the decades to come.

Furthermore, under those circumstances there would be few substitute plants capable of establishing themselves well enough to provide soil retention. One is the notorious "cheat grass" that has played a large role in more easily propagated Western wildfires and has been the target of eradication efforts in Utah.

5. Using NAAQS as the means for judging the public health consequence of air quality impacts from this project is inadequate. Because of the perennially slow regulatory process, even under the best of circumstances there is a multi-year time lag between new results from medical science and corresponding adjustments of federal regulations. However, the degree to which new science triumphs over politics in updating EPA standards can vary widely depending on the personalities and political philosophies of the current Administration.

Recently published medical research has clearly established that for particulate matter air pollution there is no threshold below which health effects are not seen. In other words, any increase in pollution will have an impact on public health whether or not it reaches the threshold of the NAAQS.

In fact, this research has established repeatedly that for many pollution components, including particulate matter, the disease consequence is not linearly related to ambient concentrations. In the same way that smokers of only a few

cigarettes a day have almost as much clinical risk as heavy smokers, exposure to low concentrations of pollution carries almost as much risk as exposure to much higher concentrations. **If the Las Vegas pipeline ends up creating more particulate pollution, but the concentrations remains below current PM 10 standards, that does not mean public health will have been protected.**

6. There are unique threats in the soil in the West Desert that will have potentially profound impacts on public health beyond just particulate matter. Mercury, erionite (an asbestos like mineral that causes the same kind of mesothelioma cancer), the radioactive elements americium, plutonium, uranium, cobalt, cesium, strontium, and europium, and the fungal spores that cause Valley Fever (coccidioidomycosis) are all in high concentrations in surface soils in Nevada. Other diseases now thought to be transmitted through microorganisms carried by dust are meningitis, influenza, SARS, and foot and mouth disease.

Nevada soils contain some of the most toxic substances known and yet this agreement does nothing to assess or mitigate this threat.

7. The publicly offered rationale from Utah's executive branch for entering into this agreement now centers on the desirability of avoiding a prolonged and perhaps costly court battle with Nevada in the future. We caution that this agreement will likely result in more legal battles not less. If public health impacts are suspected or even proven the enforcement arm of this agreement is so vague that it would almost guarantee lawsuits between Utah and Nevada as well as between Utah and clean air advocacy groups whose position would be that Utah was not doing enough to protect public health.

If Nevada commits billions of dollars to begin the pumping and hundreds of thousands of new Nevada home owners become dependent on the water, realistically Utah will not be able to stop the pumping without a costly, possibly decades long court battle regardless of any agreement. Meanwhile the public health impacts would likely continue for the duration of the legal battle. When Los Angeles signed agreements regarding Owens Valley pumping, they were sued but continued pumping for 21 years while the case meandered through the courts.

Dust from Nevada would also carry with it economic, quality of life and aesthetic consequences that would likely broaden the state of Utah's legal exposure, possibly causing other parties to enter the dispute, like business entities. The ski industry is one of many examples of likely stakeholders. **In sum, this agreement is not likely to prevent legal disputes, instead it is only likely to delay them, change the issues, make them more complex, increase the number of litigants and leave public health vulnerable for the duration of the legal process.**

UPHE urges the governor's office to use its considerable influence to take an

aggressive stand toward water conservation throughout the West. We see many opportunities to shape public behavior that would pay huge dividends in reducing our water consumption and obviate the need for water diversion projects like the Las Vegas pipeline. Other desert cities in the US and Australia have achieved much greater reductions in water consumption than Las Vegas and Utah should insist those reductions precede any water diversion projects. In turn Utah should adopt those same practices to show Nevada that it in fact can be done. UPHE considers water conservation closely related to the protection of public health.

Our preceding comments stem from our medical expertise and concern for the health of all Utah residents. However, as citizens we also wish to speak up on behalf of those people in the rural farming communities and Goshute Reservation whose health and livelihoods will be put at even greater risk. How a society treats the most vulnerable and powerless among them is a reflection of its moral character. Utah should be setting an example of defending from exploitation, all its citizens, no matter who they are or where they live.

Sincerely,

Dr. Brian Moench
President, Utah Physicians for a Healthy Environment.